

FRIEDMAN & BRUYA, INC.

ENVIRONMENTAL CHEMISTS

Date of Report: 09/05/02

Date Received: 08/15/02

Project: Metro Self Monitor Grab, PO# M88856

Date Extracted: 08/30/02

Date Analyzed: 08/30/02

**RESULTS FROM THE ANALYSIS OF THE WATER SAMPLE
FOR TOTAL METALS BY
INDUCTIVELY COUPLED PLASMA (ICP)
(METHOD 6010)**

Results Reported as mg/L (ppm)

<u>Sample ID</u> Laboratory ID	<u>Chromium</u>	<u>Copper</u>	<u>Nickel</u>	<u>Zinc</u>
M88856 208096-01	0.17	0.21	0.14	0.10
Method Blank	<0.05	<0.05	<0.05	<0.05

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QUALITY ASSURANCE RESULTS FROM TOTAL METALS BY INDUCTIVELY COUPLED PLASMA (ICP) (METHOD 6010)

Laboratory Code: 208212-01 (Duplicate)

Analyte	Reporting Units	Sample Result	Duplicate Result	Relative Percent Difference	Acceptance Criteria
Chromium	mg/L (ppm)	0.27	0.31	14	0-20
Copper	mg/L (ppm)	0.17	0.17	0	0-20
Nickel	mg/L (ppm)	0.14	0.16	13	0-20
Zinc	mg/L (ppm)	<0.05	<0.05	nm	0-20

Laboratory Code: 208212-01 (Matrix Spike)

Analyte	Reporting Units	Spike Level	Sample Result	% Recovery MS	Acceptance Criteria
Chromium	mg/L (ppm)	2	0.27	84	80-120
Copper	mg/L (ppm)	2	0.17	78	80-120
Nickel	mg/L (ppm)	4	0.14	81	80-120
Zinc	mg/L (ppm)	2	<0.05	89	80-120

Laboratory Code: Laboratory Control Sample

Analyte	Reporting Units	Spike Level	% Recovery LCS	% Recovery LCSD	Acceptance Criteria	RPD (Limit 20)
Chromium	mg/L (ppm)	2	91	88	80-120	3
Copper	mg/L (ppm)	2	86	88	80-120	2
Nickel	mg/L (ppm)	4	88	86	80-120	2
Zinc	mg/L (ppm)	2	93	104	80-120	11

nm - The analyte was not detected in one or more of the duplicate analyses. Therefore, calculation of the RPD is not applicable.

FRIEDMAN & BRUYA, INC.

ENVIRONMENTAL CHEMISTS

James E. Bruya, Ph.D.
Charlene Morrow, M.S.
Yelena Aravkina, M.S.
Bradley T. Benson, B.S.
Kurt Johnson, B.S.

3012 16th Avenue West
Seattle, WA 98119-2029
TEL: (206) 285-8282
FAX: (206) 283-5044
e-mail: fbi@isomedia.com

September 5, 2002

DUPLICATE COPY

INVOICE #02ACU0905-2

Accounts Payable
Alaskan Copper Works
628 South Hanford
Seattle, WA 98134

RE: Project Metro Self Monitor Grab, PO# M88856 - Results of testing requested
by Gerry Thompson for material submitted on August 15, 2002.

1 sample analyzed for Total Chromium, Copper, Nickel and Zinc by Method 6010B @ \$80 per sample	<u>\$ 80.00</u>
Amount Due	\$ 80.00

FEDERAL TAX ID # (b) (6)

208096

ME 8/15/02 AI

AKC-0009124

SAMPLE CHAIN OF CUSTODY

Send Report To GERARD Thompson
 Company ALASKAN Copper works
 Address 628 S. Harvard ST
 City, State, ZIP Seattle WA 98134
 Phone # 206-382-8379 Fax # 206-382-4309

SAMPLER'S <u>(Signature)</u>	
PROJECT NAME/NO. <u>METRO Self monitor Creek</u>	PO # <u>M88856</u>
REMARKS	

Page # _____ of _____
TURNAROUND TIME <input type="checkbox"/> Standard (2 Weeks) <input type="checkbox"/> RUSH _____ Rush charges authorized by: _____
SAMPLE DISPOSAL <input type="checkbox"/> Dispose after 30 days <input type="checkbox"/> Return samples <input type="checkbox"/> Will call with instructions

Sample ID	Lab ID	Date Sampled	Time Sampled	Sample Type	# of containers	ANALYSES REQUESTED										Notes
						TPH-Diesel	TPH-Gasoline	BTEX by 8021B	VOCs by 8260	SVOCs by 8270	HFS	Ch, Cy, n, 2, 3, 4				
M88856	01	8/15/02	10:00	H ₂ O	1											

Friedman & Bruya, Inc.
 3012 16th Avenue West
 Seattle, WA 98119-2029
 Ph. (206) 285-8282
 Fax (206) 283-5044

SIGNATURE	PRINT NAME	COMPANY	DATE	TIME
Relinquished by: <u>(Signature)</u>	<u>GERARD Thompson</u>	<u>ACW</u>	<u>8/15/02</u>	<u>11:05 AM</u>
Received by: <u>(Signature)</u>	<u>Laura Hooper</u>	<u>F & B, Inc.</u>	<u>↓</u>	<u>↓</u>
Relinquished by:				
Received by:				

FRIEDMAN & BRUYA, INC.

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September 5, 2002

Gerry Thompson, Project Manager
Alaskan Copper Works
628 South Hanford
Seattle, WA 98134

Dear Mr. Thompson:

Included are the results from the testing of material submitted on August 15, 2002 from your Metro Self Monitor Grab, PO# M88856 project. Any samples that may remain are currently scheduled for disposal in 30 days. If you would like us to return your samples or arrange for long term storage at our offices, please contact us as soon as possible.

We appreciate this opportunity to be of service to you and hope you will call if you should have any questions.

Sincerely,

FRIEDMAN & BRUYA, INC.



Michael Erdahl
Project Manager

Enclosures
ACU0904R.DOC